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Introduction



1. INTRODUCTION

I. Purpose of the Plan

The pedestrian plan has four major goals:

1. To provide policies and guidelines for facilities that will make walking safer, easier, and more attractive.
2. To provide design standards for physical improvements related to the pedestrian realm.
3. To outline steps to encourage walking as an alternative to automobile travel, as beneficial exercise, and as a benefit to the community.
4. To provide an action plan to create an economical and efficient non-automobile transportation network within Cambridge and connecting to other communities and destinations.

Given the city's age and the variety in its physical space, the plan will best achieve its intended goals if it is applied with sensitivity to the history and idiosyncrasies of each place.

II. Why Cambridge Promotes Walking

A. Federal, State, Regional, and Municipal Mandates, Policies, and Programs

In the 1991 federal transportation appropriations act, known as the Intermodal Surface Transportation Efficiency Act, or ISTEA, Congress ordered a national study to determine current levels of bicycling and walking, both to learn why they are not used more for transportation and to develop a plan to increase their use. The resulting *National Bicycling and Walking Study* presents a plan of action on the federal, state, and local levels to double the current percentage of trips made by walking and bicycling and to reduce deaths and injuries to pedestrians and bicyclists by 10%. The Federal Highway Administration recommends that a pedestrian impact analysis be part of the review of all development plans.

Like ISTEA, its successor, TEA-21, the Transportation Equity Act for the Twenty-first Century, requires that 10% of the highway funds in the Surface Transportation Program component be used for "enhancement activities," which include bicycle and pedestrian facilities.

On the state level, *Accessing the Future: The Intermodal Transportation Policy Plan* calls for development of facilities that will make walking safer and attractive to more travelers. State law (Chapter 87) requires the highway commissioner to "make all reasonable provisions for the accommodation of bicycle and pedestrian traffic in the planning, design, and construction, reconstruction, or maintenance of any project undertaken by the department."

The Metropolitan Area Planning Council, the regional planning agency for Metropolitan Boston, has adopted a regional bicycle and pedestrian plan that calls for increased walking as a share of transportation.

The 1990 federal Clean Air Act Amendments require areas that do not meet clean air standards to adopt measures to improve air quality. The 1992 Vehicle Trip Reduction Ordinance (VTRO) is the legislation the Cambridge City Council adopted to meet these requirements. The ordinance mandates a variety of measures to encourage residents and people commuting to Cambridge to reduce

automobile use; these measures include creation of a pedestrian master plan and development of pedestrian amenities.

B. Cambridge Growth Policies

A city of walkers is integral to the vision for a sustainable Cambridge laid out in the 1994 Cambridge growth policy document, *Toward a Sustainable Future*.

The vision includes “significantly reduced automobile traffic. Walking, carpooling, public transit, bicycling and jitney trips are the norm.”

Good pedestrian facilities are important to realizing other goals articulated in the plan:

- *A vibrant, stable population of diverse races, cultures and viewpoints...* where families with children can thrive. A walkable city is especially important for people with disabilities, the elderly, children, and people who cannot afford to keep a car. Reducing automobile traffic increases children's opportunities to engage in unstructured, active play with other children in their neighborhood.
- *Pollution prevention* . . . The automobile is the greatest single cause of air, water, and land pollution, and of global climate change. Most car trips in Cambridge are short trips; these create the most air pollution per mile driven and are the trips most easily replaced by walking.
- *A thriving economic base* . . . Good public transportation, which is only possible if many people are willing to walk to and from bus and subway stops to their destinations, is essential to the city's economy. Cambridge is one of the most densely populated cities in the United States. Much of the conflict between new development and residential needs arises from concerns about automobile traffic and parking.¹
- *Vital and distinctive retail centers* . . . Pedestrians and public transportation are essential for the health of retail centers in Cambridge, where little space for expanded parking is available. Walkability is an important component of the city's appeal as a tourist destination, especially as visitor parking is scarce in much of the city.
- *Strengthened and stabilized neighborhoods* . . . Studies have shown that the more automobile traffic on a street, the less interaction among neighbors.² Walking is itself a positive force for creating a sense of neighborhood. The more people meet each other on the street, the stronger and safer the neighborhood is.



C. Walking and Health

Evidence is growing that regular exercise is important for positive physical and mental health. Recent studies have suggested that moderate exercise such as walking offers many of the same health benefits as strenuous exercise. Walking helps prevent heart disease, obesity, hypertension,

- 1 In addition, automobile use costs the city money. The Conservation Law Foundation estimates that for every mile a person walks rather than drives alone the public saves \$.11 to \$.17 in tax dollars in direct costs, many of them paid by local communities (see Appendix II). There are also heavy indirect costs related to the effects of pollution on buildings, health, and water supplies.
- 2 Donald Appleyard, *Livable Streets*, Berkeley, U. of California Press (1981), pp. 15-39.

osteoporosis, diabetes, and depression (see Appendix XIII). About 50 percent of all Americans are overweight, and regular exercise is a key component of effective weight-loss programs.

Walking is the most readily available form of exercise; it does not require special preparation, equipment, or locations and can be easily incorporated into most people's daily lives. People are more likely to stick to walking than to other forms of exercise.³



Children need safe walking environments.

3 Paul Z. Siegel, Robert M. Brackbill, and Gregory W. Heath, "The Epidemiology of Walking for Exercise: Implications for Promoting Activity among Sedentary Groups," *American Journal of Public Health* (May 1995).

